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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/785,133	02/24/2004	Christopher M. Gallant	05918-324001 / VGCP NO. 7	1633
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EXAMINER RODRIGUEZ, RUTH C				
ART UNIT		PAPER NUMBER		
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**Please find below and/or attached an Office communication concerning this application or proceeding.**

The time period for reply, if any, is set in the attached communication.

### Office Action Summary

**Application No.**

10/785,133

**Applicant(s)**

GALLANT ET AL.

**Examiner**

Ruth C. Rodriguez

**Art Unit**

3677

**Period for Reply** -- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

**Status**

- 1) ☒ Responsive to communication(s) filed on 08 April 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

**Disposition of Claims**

- 4) ☒ Claim(s) 38-50 and 69-103 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 38-50 and 69-74 is/are allowed.
- 6) ☒ Claim(s) 75-103 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

**Application Papers**

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 24 February 2004 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

**Priority under 35 U.S.C. § 119**

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
  2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

**Attachment(s)**

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: \_\_\_\_\_

## DETAILED ACTION

### ***Continued Examination Under 37 CFR 1.114***

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after allowance or after an Office action under *Ex Parte Quayle*, 25 USPQ 74, 453 O.G. 213 (Comm'r Pat. 1935). Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, prosecution in this application has been reopened pursuant to 37 CFR 1.114. Applicant's submission filed on 08 April 2008 has been entered.

### ***Claim Rejections - 35 USC § 102***

2. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) and the Intellectual Property and High Technology Technical

Amendments Act of 2002 do not apply when the reference is a U.S. patent resulting directly or indirectly from an international application filed before November 29, 2000. Therefore, the prior art date of the reference is determined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

3. Claims 75, 80, 82, 87 and 97-100 are rejected under 35 U.S.C. 102(b) as being anticipated by Marchese et al. (US 3,748,697).

A self-engageable fastener component (10) comprises a sheet-form base (12) and an array of wedge-shaped, engageable elements (14) extending integrally from at least one side of the sheet-form base (Figs. 1-5). Each of the engageable elements has an engageable side and a non-engageable side conterminous at an upper edge of the element (Figs. 1-5). The upper edge of each engageable element defines a curve in top view (Figs. 1 and 3). The engageable sides of a majority of the elements are oriented in a common direction (Figs. 1-5). The engageable side intersects an upper surface of the base and the non-engageable side extends from the base to the upper edge of the element (Figs. 1-5).

The curve defined by the upper edge in top view is substantially circular with a constant radius of curvature (Figs. 1 and 3)

The curve defined by the upper edge in top view is of a group consisting of parabolic curves, ellipsoidal curves, hyperbolic curves, and mixtures thereof (Figs. 1 and 3).

The engageable sides of the wedge-shaped engageable elements overhang the sheet-form base (Figs. 1-5).

The sheet-form base forms an elongated strap (Figs. 1-5).

The fastener component comprising only a single row of the wedge-shaped elements, all arranged with their engageable sides directed toward an end of the strap (Figs. 1-5).

The fastener component defines an aperture (formed by 21) adjacent one end of the strap. The aperture sized to receive an opposite end of the strap therethrough (Figs. 1-5).

The fastener component further comprises an exposed retention edge (16) along one side of the aperture. The retention edge positioned to engage the engageable sides of the wedge-shaped elements with the opposite end of the strap pulled through the aperture, to resist removal of the strap from the aperture (Figs. 1-5).

The sheet-form base is flexible (Figs. 1-5).

4. Claims 75-80, 82, 86-91, 93 and 101 are rejected under 35 U.S.C. 102(b) as being anticipated by Lauer (US 6,911,171 B2).

A self-engageable fastener component (20) comprises a sheet-form base (20) and an array of wedge-shaped, engageable elements (26) extending integrally from at least one side of the sheet-form base (Figs. 4 and 5). Each of the engageable elements has an engageable side and a non-engageable side conterminous at an upper edge of the element (Figs. 4 and 5). The upper edge of each engageable element defines a curve in top view (Fig. 4). The engageable sides of a majority of the elements are oriented in a common direction (Figs. 4). The engageable side intersects an upper

surface of the base and the non-engageable side extends from the base to the upper edge of the element (Figs. 4 and 5).

The engageable elements are arranged in at least one row along the sheet-form base, the row extending toward the single edge (Figs. 4 and 5).

The engageable elements are arranged in an array of multiple rows and columns (Figs. 4 and 5).

The engageable elements are arranged in multiple rows, with engageable elements of adjacent rows offset from one another along their respective rows (Figs. 4 and 5).

The engageable elements of adjacent rows are offset by about one-half a nominal spacing between adjacent engageable elements within a row (Figs. 4 and 5).

The curve defined by the upper edge in top view is substantially circular with a constant radius of curvature (Fig. 4)

The curve defined by the upper edge in top view is of a group consisting of parabolic curves, ellipsoidal curves, hyperbolic curves, and mixtures thereof (Fig. 4).

The engageable sides of the wedge-shaped engageable elements overhang the sheet-form base (Figs. 4 and 5).

The sheet-form base forms a tube, with the wedge-shaped elements extending from a curved surface of the tube (Fig. 1).

The curved surface comprises an outer surface of the tube (Fig. 1).

The tube defines a longitudinal gap extending along its length between opposite edges of the sheet-form base (Fig. 1).

The sheet-form base is secured to, and overlays a layer of resilient material (Fig. 5).

The non-engageable side of each fastener element rises from the sheet-form base at an angle of between about 5 and 45 degrees (Fig. 5).

The engageable side of each fastener element extends downward from the upper edge toward the sheet-form base at an undercut angle, measured in a midplane bisecting the fastener element and perpendicular to the sheet-form base, of between about 10 and 45 degrees (Fig. 5).

5. Claims 75-80, 82, 87, 89, 94, 95, 97, 98, 102 and 103 are rejected under 35 U.S.C. 102(b) as being anticipated by Burnett et al. (US 7,117,536 B2).

A self-engageable fastener (10) component comprises a sheet-form base (10) and an array of wedge-shaped, engageable elements (52) extending integrally from at least one side of the sheet-form base. Each of the engageable elements has an engageable side and a non-engageable side conterminous at an upper edge of the element (Fig. 4). The upper edge of each engageable element defines a curve in top view (Fig. 4). The engageable sides of a majority of the elements are oriented in a common direction (Fig. 4). The engageable side intersects an upper surface of the base and the non-engageable side extends from the base to the upper edge of the element (Fig. 4).

The engageable elements are arranged in at least one row along the sheet-form base, the row extending toward the single edge (Fig. 4).

The engageable elements are arranged in an array of multiple rows and columns (Fig. 4).

The engageable elements are arranged in multiple rows, with engageable elements of adjacent rows offset from one another along their respective rows (Fig. 4).

The engageable elements of adjacent rows are offset by about one-half a nominal spacing between adjacent engageable elements within a row (Fig. 4).

The curve defined by the upper edge in top view is substantially circular with a constant radius of curvature (Fig. 4).

The curve defined by the upper edge in top view is of a group consisting of parabolic curves, ellipsoidal curves, hyperbolic curves, and mixtures thereof.

The engageable sides of the wedge-shaped engageable elements overhang the sheet-form base (C. 5, L. 20-44).

The engageable elements extend outwardly from two opposite sides of the sheet-form base (Fig. 4).

The sheet-form base forms an elongated, U-shaped structure (Fig. 4).

The wedge-shaped elements extend from an inside surface of the U-shaped structure, a majority of the engageable sides of the wedge-shaped elements directed away from an open edge of the U-shaped structure (Fig. 6).

The sheet-form base forms an elongated strap (Fig. 6).

The fastener component comprising only a single row of the wedge-shaped elements, all arranged with their engageable sides directed toward an end of the strap (Fig. 4).

The sheet-form base is flexible (C. 3, L. 52-55).

In combination, two fastener components (each side is a component) with each component arranged with the engageable sides of their wedge-shaped elements overlapping one another to resist shear motion between the fastener components (Fig. 6).

***Claim Rejections - 35 USC § 103***

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 81, 83-85 and 92 are rejected under 35 U.S.C. 103(a) as being unpatentable over Lauer.

Lauer discloses a fastener having all the features mentioned above for the rejection of claims 75 and 80. Lauer fails to disclose any of the dimensions for the fastener. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have the constant radius of curvature is from about 0.25 to 2.5 centimeters, a maximum elevation of the upper edge above the top surface of the sheet-form base is between about 0.025 and 6.3 millimeters, each engageable element has a width, measured along the sheet-form base perpendicular to the single edge, of between about 0.13 and 6.3 millimeters and each engageable element has a length, measured along the sheet-form base parallel to the edge, of between about 0.13

Art Unit: 3677

and 2.54 centimeters for the fastener disclosed by Lauer since a change in the size of a prior art device is a design consideration within the skill of the art. In re Rose, 220 F.2d 459, 105 USPQ 237 (CCPA 1955). In this case the fastener is used with a bottle and therefore the dimensions of the engaging elements should be similar to the claimed dimension.

Lauer fails to disclose that the curved surface comprises an inner surface of the tube. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have the curved surface comprises an inner surface of the tube since the reversal of components in a prior art reference, where there is no disclosed significance to such reversal, is a design consideration within the skill of the art. In re Gazda, 219 F.2d 449, 104 USPQ 400 (CCPA 1955); In re Japikse, 181 F.2d 1019, 86 USPQ 70 (CCPA 1950). In this case the inner surface of the bottle could also be lined with the fastener layer disclosed by Lauer.

8. Claims 81, 83-85 and 96 are rejected under 35 U.S.C. 103(a) as being unpatentable over Burnett et al.

Burnett discloses a fastener having all the features mentioned above for the rejection of claims 75 and 80. Burnett fails to disclose any of the dimensions for the fastener. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have the constant radius of curvature is from about 0.25 to 2.5 centimeters, a maximum elevation of the upper edge above the top surface of the sheet-form base is between about 0.025 and 6.3 millimeters, each engageable element has a width, measured along the sheet-form base perpendicular to the single

Art Unit: 3677

edge, of between about 0.13 and 6.3 millimeters and each engageable element has a length, measured along the sheet-form base parallel to the edge, of between about 0.13 and 2.54 centimeters for the fastener disclosed by Burnett since a change in the size of a prior art device is a design consideration within the skill of the art. In re Rose, 220 F.2d 459, 105 USPQ 237 (CCPA 1955). In this case the fastener is used with a gripper engaged by the fingers and therefore the dimensions of the engaging elements should be similar to the claimed dimension.

Burnett fails to disclose that the wedge-shaped elements extend from an outside surface of the U-shaped structure. However, it would have been obvious to one having ordinary skill in the art at the time the invention was made to have the wedge-shaped elements extend from an outside surface of the U-shaped structure since the gripper is a flexible member and it can be folded backwards in order to have the wedge-shaped elements extending from an outside surface of the U-shaped structure.

#### ***Allowable Subject Matter***

9. Claims 38-50 and 69-74 are allowed.

#### ***Conclusion***

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Kushner (US D295,768), Rooney (US 5,656,014), Hsu (US 5,753,332), Arbogast (US 6,311,171) and Wahistrom et al. (US 7,212,869) are cited to show state of the art

with respect to devices that comprise a wedge-shaped element having some of the features being claimed by the current application.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ruth C Rodriguez whose telephone number is (571) 272-7070. The examiner can normally be reached on M-F 07:15 - 15:45.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Victor D. Batson can be reached on (571) 272-6987.

Submissions of your responses by facsimile transmission are encouraged. The fax phone number for the organization where this application or proceeding is assigned is (571) 273-8300. Recognizing the fact that reducing cycle time in the processing and examination of patent applications will effectively increase the patent's term, it is to your benefit to submit responses by facsimile transmission whenever permissible. Such submission will place the response directly in our examining group's hands and will eliminate Post Office processing and delivery time as well as PTO's mailroom processing and delivery time. For a complete list of correspondence **not** permitted by facsimile transmission, see MPEP § 502.01. In general, most responses and/or amendments not requiring a fee, as well as those requiring a fee but charging such fee to a deposit account, can be submitted by facsimile transmission. Responses requiring a fee that the applicant is paying by check **should not be** submitted by facsimile transmission separately from the check.

Responses submitted by facsimile transmission should include a Certificate of Transmission (MPEP § 512). The following is an example of the format the certification might take:

I hereby certify that this correspondence is being facsimile transmitted to  
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(Typed or printed name of person signing this certificate)

(Signature)

If your response is submitted by facsimile transmission, you are hereby reminded that the original should be retained as evidence of authenticity (37 CFR 1.4 and MPEP § 502.02). Please do not separately mail the original or another copy unless required by the Patent and Trademark Office. Submission of the original response or a follow-up copy of the response has been transmitted by facsimile will cause further unnecessary delays in the processing of your application, duplicate responses where fees are charged to a deposit account may result in those fees being charged twice.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (571) 272-6640.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should

Art Unit: 3677

you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

/Robert J. Sandy/  
Primary Examiner, Art Unit 3677

/RCR/  
Ruth C. Rodriguez  
Patent Examiner  
Art Unit 3677

rcr  
May 17, 2008